IN THE CLAIMS

Please amend the claims as follows:

1 (Currently Amended). An image processing apparatus, comprising:

a determining unit configured to determine image characteristics of areas in an image data corresponding to an image, said determining unit includes an edge separation unit configured to detect a character edge from the image data, a halftone detecting unit configured to determine whether a target pixel is halftone or non-halftone, and a color determining unit configured to determine whether the target pixel is chromatic or achromatic, and said determining unit is configured to generate area data corresponding to each of the areas based at least in part on the character edge detected by the edge separation unit;

a memory configured to store the image data and the area data in a correlated manner;

an image processing unit including a gamma correction unit, a color correction unit, and a gradation processing unit, wherein

said gamma correction unit is configured to effect a gamma correction, using an S-shaped gamma curve line, on specific image data stored in the memory based on processing conditions set for the area data correlated with the specific image data when the specific image data is determined to be a character area as a result of edge-detecting,

said gamma correction unit is configured to effect the gamma correction, using a linear gamma line, on the specific image data stored in the memory when the specific image data is determined to be a non-edge area as a result of edge-detecting;

said color correction unit is configured to convert a pixel of the specific image data from CMYK image data to RGB image data in such a way that chroma is heightened when the pixel of the specific image data is determined to be a color character based on a setting of parameters, the parameters being based on the area data correlated with the specific image, and that respective values of R, G, and B are equal to each other when the pixel of the

specific image data is determined to be a black character, and

said image gradation processing unit is configured to effect a <u>simple binarization</u>

<u>process where a binarizing threshold value is set low</u> ~~gradation processing~~ on <u>the pixel of</u> the

specific image data ~~based on the area data correlated with the specific image data~~ <u>when the</u>

<u>pixel of the specific image data is determined to be a character area as a result of edge</u>

<u>detecting</u>;

said image gradation processing unit is configured to effect a <u>multi-dither process</u>

~~gradation processing~~ on <u>the pixel of</u> the specific image data ~~based on the area data correlated~~

~~with the specific image data~~ <u>when the pixel of the specific image data is determined to be in a</u>

<u>picture area as a result of edge detecting</u>;

an image format conversion unit configured to convert a file format of the RGB image

data processed by the image processing unit into a general-purpose image file format; and

a transmission unit configured to send the image data in the general-purpose image

file format to an external device.

2 (Previously Presented). The image processing apparatus according to claim 1,

wherein the image characteristics include one or more of character, photograph, color, and

presence of halftone.

3 (Previously Presented). The image processing apparatus according to claim 2,

wherein the image characteristic is any one or more of the character and the photograph.

4 (Canceled).

5 (Canceled).

6 (Previously Presented). The image processing apparatus according to claim 1, further comprising an image formation unit configured to form an image on a recording medium based on the image data stored in the memory.

7 (Currently Amended). An image processing apparatus, comprising:

an acquiring unit configured to acquire an image data corresponding to an image;

a determining unit configured to determine image characteristics in the image data, said determining unit including an edge separation unit configured to detect a character edge from the image data, a halftone detecting unit configured to determine whether a target pixel is halftone or non-halftone, and a color determining unit configured to determine whether the target pixel is chromatic or achromatic, and said determining unit is configured to generate area data corresponding to each of the areas based at least in part on the character edge detected by the edge separation unit;

an image area separation unit configured to separate the image into areas corresponding to each of the image characteristics and generates area data corresponding to each of the areas;

a memory configured to store the image data and the area data in a correlated manner;

an image processing unit including a gamma correction unit, a color correction unit, and a gradation processing unit;

said gamma correction unit configured to effect a gamma correction, using an S-shaped gamma curve line, on specific image data stored in the memory based on processing conditions set for the area data correlated with the specific image data when the specific image data is determined to be a character area as a result of edge detecting;

said gamma correction unit is configured to effect the gamma correction, using a

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linear gamma line, on the specific image data stored in the memory when the specific image data is determined to be a non-edge area as a result of edge detecting;

said color correction unit configured to convert a pixel of the specific image data from CMYK image data to RGB image data in such a way that chroma is heightened when the pixel of the specific image data is determined to be a color character, based on the area data correlated with the specific image; and that respective values of R, G, and B are equal to each other when the pixel of the specific image data is determined to be a black character;

said image gradation processing unit configured to effect a simple binarization process where a binarizing threshold value is set low gradation processing on a pixel of the specific image data based on the area data correlated with the specific image data when the pixel of the specific image data is determined to be a character area as a result of edge detecting and to effect a multi-dither process on the pixel of the specific image data when the pixel of the specific image data is determined to be in a picture area as a result of edge detecting;

an image conversion unit configured to convert a file format of the image data processed by the image processing unit into a general-purpose format image file format; and

a transmission unit configured to send the image data in the general-purpose image file format to an external display device.

8 (Previously Presented). The image processing apparatus according to claim 7, further comprising a filtering unit configured to subject the image data corresponding to the image characteristics to filter processing.

9 (Previously Presented). The image processing apparatus according to claim 7, wherein the image data acquired by the acquiring unit includes Red, Green, and Blue color

components, the image area separation unit is configured to separate an image area

corresponding to black characters from the image data, and the image processing unit is

configured to adjust the Red, Green, and Blue color components forming the image data in

the separated image area of the black characters so that the components have the same value.

10 (Previously Presented). The image processing apparatus according to claim 7,

wherein the image characteristic is a character.

11 (Previously Presented). The image processing apparatus according to claim 7,

wherein the image data acquired by the acquiring unit includes Red, Green, and Blue color

components, the image area separation unit is configured to separate the image area

corresponding to a white background from the image data, and the image processing unit is

configured to adjust the Red, Green, and Blue color components forming the image data on

the separated white background image area so that the components have the same value.

12 (Canceled).

13 (Currently Amended). An image processing method, comprising:

determining image characteristics of areas in an image data corresponding to an

image;[[,]]

detecting a character edge from the image data; and

determining whether a target pixel is halftone or non-halftone;

determining whether the target pixel is chromatic or achromatic;

to generate generating area data corresponding to each of the areas based at least in

part on the character edge detected by the edge separation unit;

storing the image data and the area data in a correlated manner;

effecting a gamma correction, using an S-shaped gamma curve line, on specific image data stored in the memory based on processing conditions set for the area data correlated with the specific image data when the specific image data is determined to be a character area as a result of edge detecting;

effecting the gamma correction, using a linear gamma line, on the specific image data stored in the memory when the specific image data is determined to be a non-edge area as a result of edge detecting;

converting a pixel of the specific image data from CMYK image data to RGB image data in such a way that chroma is heightened when the pixel of the specific image data is determined to be a color character based on a setting of parameters, the parameters being based on the area data correlated with the specific image and that respective values of R, G, and B are equal to each other when the pixel of the specific image data is determined to be a black character;

effecting a simple binarization process where a binarizing threshold value is set low a gradation processing on the pixel of the specific image data based on the area data correlated with the specific image data when the pixel of the specific image data is determined to be a character as a result of edge detecting;

effecting a multi-dither process on the pixel of the specific image data when the pixel of the specific image data is determined to be in a picture area as a result of edge detecting;

converting a file format of the RGB image data processed by the image processing unit into a general-purpose image file format; and

sending the image data in the general-purpose image file format to an external device.

14 (New). The image processing apparatus of claim 1, wherein the edge separation unit comprises:

a continuous pixel detecting unit configured to detect target pixels in the image data that match with any one of a plurality of stored pixel patterns of continuously colored pixels.

15 (New). The image processing apparatus of claim 7, wherein the edge separation unit comprises:

a continuous pixel detecting unit configured to detect target pixels in the image data that match with any one of a plurality of stored pixel patterns of continuously colored pixels.

16 (New). The image processing method of claim 1, wherein the detecting comprises:

detecting target pixels in the image data that match with any one of a plurality of stored pixel patterns of continuously colored pixels.